

Recovery Plan Action Status

Plan Name: Final Recovery Plan for Six Mobile Basin Aquatic Snails

Plan Status: Final

Plan Date: 02-Dec-05

Lead Agency: USFWS

Lead Office: Mississippi Ecological Services Field Office
(601)
965-4900)

Species	Action Priority #	Action #	Action Description	Action Status	Est. Initiation Date	Est. Completion Date	Responsible Parties	Work Type	Labor Type	Action Comments
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	1.0	Protect habitat integrity and quality	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta, All Stakeholders, All Partners	Management: General, Management: Habitat Maintenance and Manipulation, Management: Land Use, Management: Planning, Other: Administration, Other: Regulations, Research: Environmental Contaminants, Research: Habitat Requirements, Research: Management Techniques	Contract, Graduate Student, Internal Administrative, Internal Field Assistance, Internal Technical Assistance, Species Expert, Volunteer	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.1	Identify stream and river reaches	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Federal Agencies, State agencies, USFWS Regional Office 4 - Atlanta	Research: Habitat Requirements, Research: Habitat Status, Research: Other Information, Research: Population Surveys, Research: Reintroduction	Contract, Internal Field Assistance, Internal Technical Assistance, Species Expert	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.2	Minimize aquatic habitat impacts	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Local Governments, County, Federal Agencies, State agencies, USFWS Regional Office 4 - Atlanta	Management: Habitat Maintenance and Manipulation, Management: Land Use, Management: Planning, Other: Information and Education, Research: Habitat Requirements, Research: Habitat Status, Research: Management Techniques	Contract, Graduate Student, Internal Field Assistance, Internal Technical Assistance, Species Expert, Volunteer	Cost may be absorbed under existing programs

Species	Action Priority #	Action #	Action Description	Action Status	Est. Initiation Date	Est. Completion Date	Responsible Parties	Work Type	Labor Type	Action Comments
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.3	Encourage development and implementation of mining guidelines	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Environmental Protection Agency, USFWS Regional Office 4 - Atlanta, State Governments, Corps of Engineers	Management: Habitat Maintenance and Manipulation, Management: Land Use, Management: Planning, Other: Information and Education, Other: Regulations, Research	Contract, Internal Administrative, Internal Field Assistance, Internal Technical Assistance	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.4	Work with States to ensure water quality	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Environmental Management, Environmental Protection Agency, USFWS Regional Office 4 - Atlanta	Management: Habitat Maintenance and Manipulation, Management: Land Use, Management: Planning, Other: Information and Education, Other: Regulations, Research: Environmental Contaminants, Research: Habitat Requirements	Contract, Internal Administrative, Internal Field Assistance, Internal Technical Assistance, Species Expert	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.5	Promote and support a watershed management approach to water quality	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Environmental Management, Environmental Protection Agency, USFWS Regional Office 4 - Atlanta	Management: Habitat Maintenance and Manipulation, Management: Land Use, Management: Planning, Other: Administration, Other: Information and Education, Other: Regulations, Research: Habitat Requirements, Research: Management Techniques	Contract, Internal Administrative, Internal Field Assistance, Internal Technical Assistance	Cost may be absorbed under existing programs

Species	Action Priority #	Action #	Action Description	Action Status	Est. Initiation Date	Est. Completion Date	Responsible Parties	Work Type	Labor Type	Action Comments
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.51	Develop coordinated plans to address WTP effluents within watersheds	Not Started			U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Environmental Management, Environmental Protection Agency, USFWS Regional Office 4 - Atlanta, Local Partners, Other states	Work type not yet selected	Labor type not yet selected	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.52	Encourage alternative STP disinfection measures	Not Started			U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Environmental Management, Environmental Protection Agency, USFWS Regional Office 4 - Atlanta	Work type not yet selected	Labor type not yet selected	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.53	Encourage compliance with current water quality discharge limitations	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Environmental Management, Environmental Protection Agency, USFWS Regional Office 4 - Atlanta	Management: General, Management: Habitat Maintenance and Manipulation, Management: Planning, Other: Administration, Other: Information and Education, Other: Regulations	Contract, Graduate Student, Internal Administrative, Internal Field Assistance, Internal Technical Assistance	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	1.54	Encourage effective silt and sediment runoff control	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Environmental Management, Environmental Protection Agency, USFWS Regional Office 4 - Atlanta, U.S. Forest Service, U.S. Dept. of Agriculture	Management: Land Use, Management: Planning	Labor type not yet selected	Cost may be absorbed under existing programs

Species	Action Priority #	Action #	Action Description	Action Status	Est. Initiation Date	Est. Completion Date	Responsible Parties	Work Type	Labor Type	Action Comments
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	1.55	Encourage standards for water withdrawal from tributary streams	Not Started			U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Environmental Management, Environmental Protection Agency, USFWS Regional Office 4 - Atlanta, U.S. Forest Service, U.S. Dept. of Agriculture	Work type not yet selected	Labor type not yet selected	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	3	10.0	Coordinate ecosystem management actions	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta	Management: General, Management: Planning, Other: Information and Education	Internal Administrative, Internal Technical Assistance	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	2.0	Consider options for river and stream mitigation	Not Started			U.S. Fish and Wildlife Service, Ecological Services Division, Environmental Protection Agency, State agencies, USFWS Regional Office 4 - Atlanta, U.S. Forest Service, U.S. Dept. of Agriculture, Corps of Engineers	Work type not yet selected	Labor type not yet selected	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	2.1	Identify appropriate mitigation measures	Not Started			U.S. Fish and Wildlife Service, Ecological Services Division, Environmental Protection Agency, State agencies, USFWS Regional Office 4 - Atlanta, U.S. Forest Service, U.S. Dept. of Agriculture, Corps of Engineers	Work type not yet selected	Labor type not yet selected	Cost may be absorbed under existing programs

Species	Action Priority #	Action #	Action Description	Action Status	Est. Initiation Date	Est. Completion Date	Responsible Parties	Work Type	Labor Type	Action Comments
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	2.11	Investigate partnerships and landowner assistance	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Environmental Protection Agency, State agencies, USFWS Regional Office 4 - Atlanta, U.S. Forest Service, U.S. Dept. of Agriculture, Corps of Engineers	Management: Land Use, Management: Planning	Internal Field Assistance, Internal Technical Assistance	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	3.0	Promote voluntary private land stewardship to reduce nonpoint pollution	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta, All involved agencies and partners	Management: Land Use, Management: Planning, Other: Information and Education	Internal Field Assistance, Internal Technical Assistance	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	3	3.1	Promote land and water stewardship awareness	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta, All involved agencies and partners	Management: Land Use, Management: Planning, Other: Information and Education	Internal Field Assistance, Internal Technical Assistance, Volunteer	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	3.2	Encourage development and implementation of adequate Streamside Management Zones	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta, All involved agencies and partners	Management: Land Use, Management: Planning, Other: Information and Education	Internal Field Assistance, Internal Technical Assistance, Volunteer	Cost may be absorbed under existing programs

Species	Action Priority #	Action #	Action Description	Action Status	Est. Initiation Date	Est. Completion Date	Responsible Parties	Work Type	Labor Type	Action Comments
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	2	4.0	Encourage and support community based watershed planning and action	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta, All involved agencies and partners	Management: Land Use, Management: Planning, Other: Information and Education	Internal Field Assistance, Internal Technical Assistance, Volunteer	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	3	4.1	Reduce land use/endangered species conflicts	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta, All involved agencies and partners	Management: Land Use, Management: Planning, Other: Information and Education	Internal Field Assistance, Internal Technical Assistance	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	5.0	Educate and involve the public in watershed stewardship	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta, All involved agencies and partners	Management: Land Use, Management: Planning, Other: Information and Education	Internal Field Assistance, Internal Technical Assistance, Volunteer	
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	6.1	Survey and monitor imperiled aquatic species	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Federal Agencies, State agencies, USFWS Regional Office 4 - Atlanta	Research: Demographic Studies, Research: Habitat Status, Research: Population Surveys	Contract, Graduate Student, Internal Field Assistance, Internal Technical Assistance, Species Expert, Volunteer	

Species	Action Priority #	Action #	Action Description	Action Status	Est. Initiation Date	Est. Completion Date	Responsible Parties	Work Type	Labor Type	Action Comments
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	6.2	Conduct anatomical and biochemical analysis of endemic species	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Appropriate agencies and partners, USFWS Regional Office 4 - Atlanta	Research: Demographic Studies, Research: Genetics, Research: Taxonomic Studies	Graduate Student, Internal Field Assistance, Internal Technical Assistance, Species Expert	
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	6.3	Determine contaminant sensitivity	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Appropriate agencies and partners, USFWS Regional Office 4 - Atlanta	Research: Environmental Contaminants	Contract, Internal Field Assistance, Internal Technical Assistance	Cost may be absorbed under existing programs
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	6.4	Conduct life history research	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Appropriate agencies and partners, USFWS Regional Office 4 - Atlanta	Research: Demographic Studies, Research: General, Research: Habitat Requirements, Research: Population Surveys, Research: Propagation	Contract, Graduate Student, Internal Field Assistance, Internal Technical Assistance, Species Expert	As needs are identified
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	7.0	Develop and implement technology for artificial propagation and captive mainenance	Complete	FY 2006	FY 2011	U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Conservation and Natural Resources, USFWS Regional Office 4 - Atlanta, All Partners	Management: Propagation, Management: Reintroduction, Research: Propagation	Graduate Student, Internal Field Assistance, Internal Technical Assistance, Species Expert	

Species	Action Priority #	Action #	Action Description	Action Status	Est. Initiation Date	Est. Completion Date	Responsible Parties	Work Type	Labor Type	Action Comments
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	1	8.0	Reintroduce species into restored habitats, as appropriate	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, Alabama Department of Conservation and Natural Resources, USFWS Regional Office 4 - Atlanta, All Partners	Management: Reintroduction, Research: Propagation, Research: Reintroduction	Graduate Student, Internal Field Assistance, Internal Technical Assistance, Species Expert	
Painted rocksnail (Leptoxis taeniata), Round rocksnail (Leptoxis ampla), Lacy elimia (snail) (Elimia crenatella), Cylindrical lioplax (snail) (Lioplax cyclostomaformis), Flat pebblesnail (Lepyrium showalteri), Plicate rocksnail (Leptoxis plicata)	3	9.0	Monitor progress and review management strategy	Ongoing Current	FY 2006		U.S. Fish and Wildlife Service, Ecological Services Division, USFWS Regional Office 4 - Atlanta, All Stakeholders, All Partners	Management: General	Internal Technical Assistance, Species Expert	